

## Solving Quadratic Equations by Factoring

Date \_\_\_\_\_ Period \_\_\_\_\_

**Solve each equation by factoring.**

1)  $(k + 1)(k - 5) = 0$

2)  $(a + 1)(a + 2) = 0$

3)  $(4k + 5)(k + 1) = 0$

4)  $(2m + 3)(4m + 3) = 0$

5)  $x^2 - 11x + 19 = -5$

6)  $n^2 + 7n + 15 = 5$

7)  $n^2 - 10n + 22 = -2$

8)  $n^2 + 3n - 12 = 6$

9)  $6n^2 - 18n - 18 = 6$

10)  $7r^2 - 14r = -7$

$$11) n^2 + 8n = -15$$

$$12) 5r^2 - 44r + 120 = -30 + 11r$$

$$13) -4k^2 - 8k - 3 = -3 - 5k^2$$

$$14) b^2 + 5b - 35 = 3b$$

$$15) 3r^2 - 16r - 7 = 5$$

$$16) 6b^2 - 13b + 3 = -3$$

$$17) 7k^2 - 6k + 3 = 3$$

$$18) 35k^2 - 22k + 7 = 4$$

$$19) 7x^2 + 2x = 0$$

$$20) 10b^2 = 27b - 18$$

$$21) 8x^2 + 21 = -59x$$

$$22) 15a^2 - 3a = 3 - 7a$$